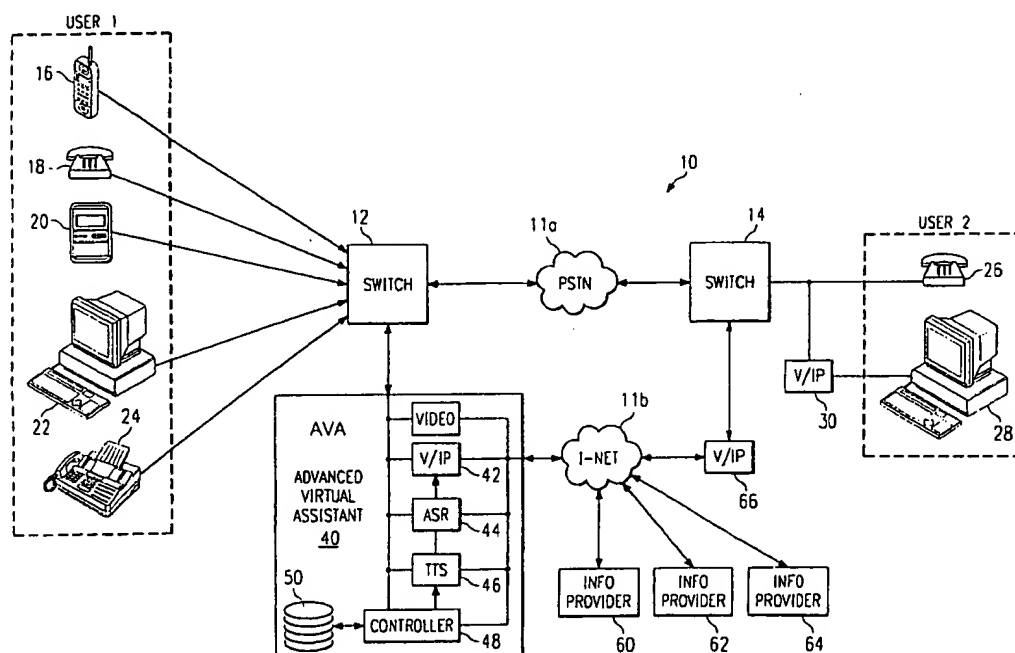




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(51) Int.Cl.<sup>7</sup> H04M 11/06, H04L 12/16  
(30) 1997/06/09 (08/871,514) US  
(54) **GESTIONNAIRE DE COMMUNICATION ELECTRONIQUE**  
(54) **ELECTRONIC COMMUNICATIONS MANAGER**



(57) L'invention concerne un gestionnaire de communication électronique constituant une interface entre un utilisateur utilisant un dispositif de communication et un réseau informatique et/ou téléphonique. Le réseau informatique, pouvant inclure un réseau Internet ou un réseau Intranet, peut être connecté à une fournisseur d'informations au moins et à un second utilisateur. Le réseau téléphonique peut également être relié au second utilisateur. Le gestionnaire de communication électronique peut

(57) An electronic communications manager (40) for providing an interface between a user (16, 18, 20, 22, 24) using a communication device and a data (11b) and/or telephone network (11a). The data network (11b), which may include an internet or intranet, is connectable to at least one information provider (60, 62, 64) as well as a second user (26, 28), and the telephone network (11a) is also connected to the second user (26, 28). The electronic communications manager (40) can receive and interpret voice, such as from the first user using a telephone



CA 02293786 1999-12-08

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International Bureau

## INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

|   |           |  |
|---|-----------|--|
| (51) International Patent Classification:<br><b>H04Q</b>  | <b>A2</b> | (11) International Publication Number: <b>WO 98/57501</b><br>(43) International Publication Date: 17 December 1998 (17.12.98)  |
| (21) International Application Number: <b>PC1/US98/10778</b><br>(22) International Filing Date: 9 June 1998 (00.06.98)<br>(30) Priority Data: 08/871,514 9 June 1997 (09.06.97) US<br>(71) Applicant: NORTHERN TELECOM LIMITED (CA/CA); 8th Floor, World Trade Center of Montreal, 380 St. Antoine Street West, Montreal, Quebec H2Y 3Y4 (CA).<br>(71)(72) Applicant and Inventor: MAY, David, C. [US/US]; 514 Harvest Drive, McKinney, TX 75070 (US).<br>(74) Agents: MCCOMB, David, L. et al.; Haynes and Boone, L.L.P., 801 Main Street, Dallas, TX 75202-3789 (US).   |           | (81) Designated States: AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CU, CZ, DE, DK, EE, ES, FI, GB, GR, GU, GM, GW, HO, ID, IL, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, UA, UG, UZ, VN, YU, ZW, ARIPO patent (GH, GM, KE, LS, MW, SD, SZ, UG, ZW), Parisian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, ML, MR, NE, SN, TD, TG).<br><br>Published<br><i>Without international search report and to be republished upon receipt of that report.</i> |
| (54) Title: <b>ELECTRONIC COMMUNICATIONS MANAGER</b><br><br>(57) Abstract<br><br>An electronic communications manager for providing an interface between a user using a communication device and a data and/or telephone network is disclosed. The data network, which may include an internet or intranet, is connectible to at least one information provider as well as a second user, and the telephone network is also connectible to the second user. The electronic communications manager can receive and interpret voice, such as from the first user using a telephone, as well as data, such as from the first user using a computer or information appliance. Likewise, the electronic communications manager can provide voice/video, such as for interacting with the first user through the telephone, and can provide data, such as interacting with the first user through the pager or interacting with the second user through the data network. Furthermore, the electronic communications manager can send and receive internet protocol to and from the information provider. |           |  |

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## WHAT IS CLAIMED IS:

- 1           1.     An integrated communications manager comprising:  
2     a voice-over internet protocol (V/IP) device for translating between voice and  
3     data;  
4           an automatic speech recognition (ASR) device for converting voice to  
5     data;  
6           a text-to-speech (TTS) device for converting data to voice;  
7           a controller for controlling the operation of the V/IP, ASR, and TTS,  
8     and for receiving and transmitting the data; and  
9           a storage device for storing the data for use by the controller;  
10          wherein the integrated communications manager is connectible to a  
11     telephone network and to a data network connectible to at least one  
12     information provider in addition to e-mail, voice mail, and facsimile systems;  
13     and  
14          wherein the integrated communications manager interacts with a first  
15     user using voice and provides an interface between [a] the first user using a  
16     communication device connectible to the integrated communications manager  
17     and one of the at least one information provider, the integrated  
18     communications manager responding to voice and data commands from the  
19     first user to access information from the at least one information provider and  
20     providing the accessed information to the first user in a requested format.
- 21          2.     The integrated communications manager of claim 1 wherein the  
22     data network is also connectible to a communication device of a second user so  
23     that the integrated communications manager serves as an interface between  
24     the first user and the second user.
- 1           3.     The integrated communications manager of claim 2 wherein the  
2     telephone network is also connectible to a communications device of the second  
3     user so that the first user may select either the telephone network or the data  
4     network for interacting with the second user.

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5           4.     The integrated communications manager of claim 1 wherein the  
6 data network includes a local area network and the information provider is a  
7 computer.

1           5.     The integrated communications manager of claim 1 wherein the  
2 integrated communications manager interacts with the first user selectively  
3 using voice or data and communicates with the information provider using  
4 data.

1           6.     The integrated communications manager of claim 5 wherein the  
2 communications device is a personal computer and wherein the data includes  
3 video clips to be displayed on the personal computer.

1           7.     The integrated communications manager of claim 1 wherein the  
2 integrated communications manager monitors communications between the  
3 first user and the information provider and stores data transmitted during the  
4 monitored communications.

1           8.     The integrated communications manager of claim 1 wherein the  
2 integrated communications manager monitors communications between the  
3 first user and the information provider for providing voice to be used during  
4 the communications.

1           9.     The integrated communications manager of claim 1 wherein the  
2 storage device also stores a user profile, a plurality of voice clips and a plurality

1           10.    The integrated communications manager of claim 1 wherein the  
2 information provider is selected from a group consisting of a concierge services  
3 provider and a financial services provider.

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1           11.    An integrated communications manager including a voice-over  
2 internet protocol (V/IP) device, an automatic speech recognition (ASR) device,  
3 a text-to-speech (TTS) device, a controller, and a storage device, wherein the  
4 integrated communications manager is connectible to a first user through a  
5 first communication device, to a telephone network, and to a data network,  
6 wherein the telephone network is connectible to at least one service provider in  
7 addition to e-mail, voice mail, and facsimile systems so that the integrated  
8 communications manager interacts with the first user using voice and acts as  
9 an interface between the first user and the service provider, and wherein the  
10 integrated communications manager is capable of listening in on the  
11 communication between the first user and the service provider for providing  
12 data to be used during the communication, the integrated communications  
13 manager responding to voice and data commands from the first user to access  
14 information from the at least one information provider and providing the  
15 accessed information to the first user in a requested format.

1           12.    An integrated communications manager including a voice-over  
2 internet protocol (V/IP) device, an automatic speech recognition (ASR) device,  
3 a text-to-speech (TTS) device, a controller, and a storage device, wherein the  
4 integrated communications manager is connectible to a first user through a  
5 first communication device, to a telephone network, and to a data network,  
6 wherein both the data network and the telephone network are connectible to a  
7 second user so that the integrated communications manager acts as an  
8 interface between the first user and the second user and allows the first user to  
9 select between the data network and telephone network for connecting to the  
10 second user to conduct real-time voice communications with the second user  
11 via the selected network.

1           15.    A method of operating an integrated communications service  
2 connected to a first user, a telephone network and to a data network having at

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3 least one information provider, wherein both the data network and the  
4 telephone network are connectible to a second user, the method comprising:  
5 receiving a first portion of information in a first format from the first  
6 user;  
7 interpreting the first portion of information into a second format;  
8 providing the first portion of information in the second format to the  
9 information provider;  
10 receiving a second portion of information in the second format from the  
11 information provider;  
12 interpreting the second portion of information into the first format;  
13 providing the second portion of information in the first format to the  
14 first user; and  
15 in response to a command from the first user selecting between the data  
16 network and telephone network, connecting the first user to the second user  
17 using the selected network to enable real-time voice communications between  
18 the first and second users via the selected network.

1 16. The method of claim 15 further comprising monitoring the  
2 connection between the first user and the second user for storing a third  
3 portion of information transferred therebetween.

1 17. The method of claim 15 further comprising monitoring the  
2 connection between the first user and the second user for providing a third  
3 portion of information.

1 18. A method of operating an electronic communications manager  
2 comprising steps of:  
3 translating back and forth between voice, internet protocol data and  
4 computer data;  
5 connecting to a first user;

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6 connecting to a data network having at least one information provider  
7 in addition to voice mail, e-mail and facsimile systems;  
8 connecting to a telephone network, wherein both the data network and  
9 the telephone network are connectible to a second user; and  
10 in response to a voice command from the first user selecting between  
11 the data network and the telephone network, connecting the first user to the  
12 second user using the selected network to enable real-time voice  
13 communications to be conducted between the first and second users via the  
14 selected network.

1 19. An electronic communications manager comprising:  
2 means for translating back and forth between voice, internet protocol  
3 data and computer data;  
4 means for connecting to a first user;  
5 means for connecting to a data network having at least one information  
6 provider in addition to voice mail, e-mail and facsimile systems;  
7 means for connecting to a telephone network, wherein both the data  
8 network and the telephone network are connectible to a second user; and  
9 means responsive to a voice command from the first user selecting  
10 between the data network and telephone network for connecting the first user  
11 to the second user using the selected network to enable real-time voice  
12 communications to be conducted between the first and second users via the  
13 selected network.

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